Proposed Map Topic

A Cat Map ***Animal Rescue Shelter Outcomes, by County (2008-2014)***

Map Objectives

Why Make This Map? What do I want to get out of it?

I am making this map because I want to see if I can bring a functional web map from vision to completion. Specifically, I wanted to make a "cat map", which more practically means to visualize statistics about shelter animal rescues and tie them to county locations in the US (because this is the data about cats I was able to find). I hope to gain a sense of whether I can also make it look good, AND have it be functional.

Persona/Anticipated User

The anticipated user of this map would be someone with an interest in the results of data collection from animal shelters (to gauge shelter participation; to glean insight; to compare data about animal shelter activity from year to year) – so probably someone related to or involved with animal rescue work.

Scenario

One anticipated scenario in which this map could be consulted runs as follows: the parents of an animal-loving high schooler have become interested in volunteering at the same responsible shelter where their daughter is a volunteer. They heard that the other shelter across town is closing, and having previously adopted a dog transferred from this shelter they wonder about the number of successful rescue outcomes in their city. Their shelter is among those that self-reports to Maddie's Fund, and they found this map in conjunction with Maddie's Fund data explorer tool. Consulting this map, they can see the comparative summary of outcomes in their county and other counties in their state; they can also see some locations of shelters in their county, and realize that despite the other shelter's closure, there are more shelters in their area than they thought.

Data Sources

-POI factory http://www.poi-factory.com/node/31702
-Maddie's Fund http://www.maddiesfund.org/searchable-database.htm
-Maddie's Fund Data Collection/Reporting Matrix Metadata http://www.maddiesfund.org/assets/documents/Grant Giving/Animal Statistics Table Annual Reporting Form.xls
-Natural Earth http://www.naturalearthdata.com/

Animal Rescue Outcomes (by County)

Summary, by county:

Intake (proportional symbols)
-total intake (cats, dogs) — proportional symbols
    -intake from public — sparklines
    -intake via transfers — number totals

Negative outcomes (proportional symbols)
-euthanasia (request, health, other) (cats, dogs)
-lost from shelter/died in shelter's care (cats, dogs)

Neutral outcomes (proportional symbols)
-transferred (cats, dogs)
-returned to habitat (cats, dogs)

Positive Outcomes (proportional symbols)
-returned to owner (cats, dogs)
-adopted (cats, dogs)

Comparative (choropleth)
-"success" rate: % of total outcomes that is positive (cats, dogs)
-"activity" level: % of total animals with an outcome (cats, dogs)
-Rescue Shelter density (shelters per county)

Other Anticipated Map Features

-Slider filters by year
-Info bar on righthand side has sparklines comparing numerical outcomes for dogs/cats
-Statistical summary in text list (by county), see above
-location of animal shelters (from POI factory) can be toggled on/off (single layer)
-check boxes for cats/dogs (either one or both)
-dropdown box allows you to choose from:
    -Intakes
    -Outcomes
        -positive
        -negative
        -neutral
    -Comparisons
        -animal services density (choropleth based on shelters per county [normalize by population?])
        -success rate
        -net animal turnover
-map information in bin that pops out from lefthand side (pinned/unpinned)
    -data sources w/links:
        -POI factory
        -Maddie's Fund
        -Maddie's Fund Data Collection/Reporting Matrix Metadata
        -Natural Earth

Anticipated Technology Stack

Data & Info Processing

-Open Office
-QGIS (maybe)

Data Formats

-CSV
-topoJSON
-geoJSON

JS Libraries

-Leaflet
-d3
-Omnivore
-Simple Statistics
-JQuery
-queue
-Sparklines
-Mapbox
-MapShaper

Other Web Technologies

-CSS
-HTML

Design Resources

-Coolors.co
-Color Brewer
-font pair
-CartoDB blog, Mapbox Gallery, etc
-JS Library docs, etc

Anticipated Creation Process

-make map functional
> one layer at a time

-make info fancy
> functional hovers, info boxes, etc
> pretty, and in good locations

-make everything pretty
> find a map style to emulate & adapt it
> fix all of the things to make it so

Practical Steps

Prep:
-wireframe & make a mockup
-create index template to start from
-gather & clean data
-outline script sequence in words (pseudo coding)
-anticipate HTML form elements that will need to be added to DOM
-choose desired projection

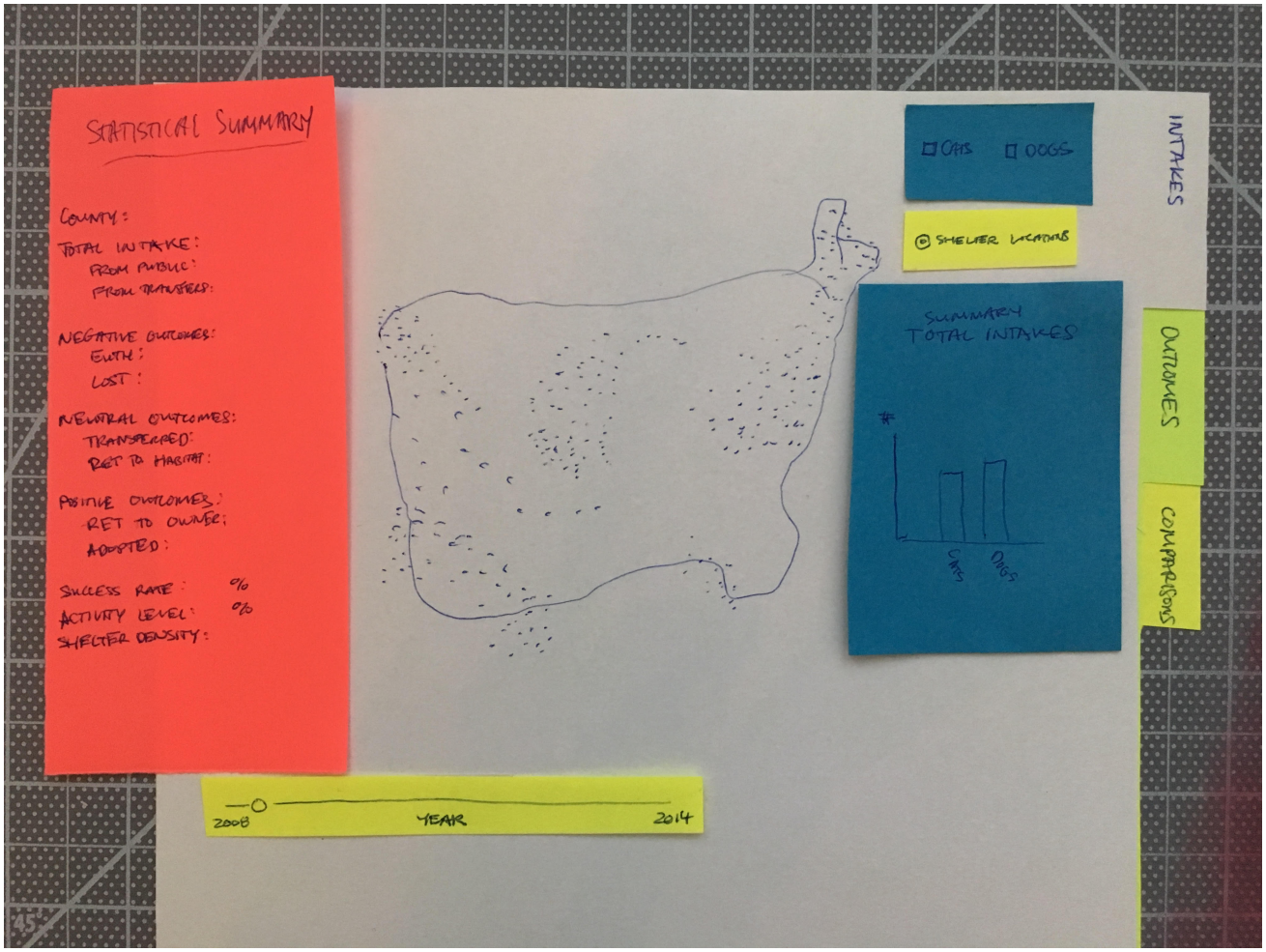
Make Map:
-create script, one function at a time, and add necessary CSS/HTML elements
-save & sync to GitHub after each successful segment is implemented
-refactor for efficiency & simplicity (esp for visual elements)

Add UX Elements:
-script in hover info, panels, sparklines, etc
-add necessary CSS/HTML elements and save/sync with each element that is added

Polish Design Elements:
-emulate a map aesthetic
-select and assign colors, spacings & margins, element locations, etc

Solicit Feedback:
-ask questions
-seek improvement – simpler, easier, better, or different than it already is

Update Portfolio (hosted through GitHub)
-add this map to GitHub pages


STATISTICAL SUMMARY
COUNTY:
TOTAL INTAKE:
FROM PUBLIC:
FROM TRANSFERS:
NEGATIVE OUTCOMES:
EUTH:
LOST:
NEUTRAL OUTCOMES:
TRANSFERRED:
RET TO HABITAT:
POSITIVE OUTCOMES:
RET TO OWNER:
ADOPTED:
SUCCESS RATE: %
ACTIVITY LEVEL: %
SHELTER DENSITY:
CATS
DOGS
SHELTER LOCATIONS
SUMMARY
TOTAL INTAKES
#
CATS
DOGS
2008
YEAR
2014
INTAKES
OUTCOMES
COMPARISONS